



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/629,910	07/30/2003	Roy Lillqvist	060091.00217	6100

32294 7590 02/20/2008
SQUIRE, SANDERS & DEMPSEY L.L.P.
14TH FLOOR
8000 TOWERS CRESCENT
TYSONS CORNER, VA 22182

EXAMINER

ADAMS, CHARLES D

ART UNIT	PAPER NUMBER
----------	--------------

2164

MAIL DATE	DELIVERY MODE
-----------	---------------

02/20/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/629,910

Applicant(s)

LILLQVIST ET AL.

Examiner

CHARLES D. ADAMS

Art Unit

2164

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 31 October 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Remarks

1. In response to communications filed on 31 October 2007, claims 1, 9, 11-13, and 15 are amended and claims 16-20 are cancelled. Claims 1-15 are pending in the application.

Specification

2. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required:

Claim 12 recites a computer readable medium. However, there is no recitation or definition of a "computer readable medium" in the specification.

Claim Rejections - 35 USC § 101

3. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

4. Claim 13 is rejected under 35 U.S.C. 101 because the claim lacks the necessary physical articles or objects to constitute a machine or a manufacture within the meaning of 35 USC 101. Though the claim is disclosed as a system, the components of the claim are only software components. There are is no hardware recited in the claim. They are clearly not a series of steps or acts to be a process nor are they a combination of

chemical compounds to be a composition of matter. As such, they fail to fall within a statutory category. They are, at best, functional descriptive material *per se*.

Descriptive material can be characterized as either "functional descriptive material" or "nonfunctional descriptive material." Both types of "descriptive material" are nonstatutory when claimed as descriptive material *per se*, 33 F.3d at 1360, 31 USPQ2d at 1759. When functional descriptive material is recorded on some computer-readable medium, it becomes structurally and functionally interrelated to the medium and will be statutory in most cases since use of technology permits the function of the descriptive material to be realized. Compare *In re Lawry*, 32 F.3d 1579, 1583-84, 32 USPQ2d 1031, 1035 (Fed. Cir. 1994).

Merely claiming nonfunctional descriptive material, i.e., abstract ideas, stored on a computer-readable medium, in a computer, or on an electromagnetic carrier signal, does not make is statutory. See *Diehr*, 450 U.S. at 185-186, 209 USPQ at 8 (noting that the claims for an algorithm in *Benson* were unpatentable as abstract ideas because "[t]he sole practical application of the algorithm was in connection with the programming of a general purpose computer.").

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the

Art Unit: 2164

applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

6. Claims 1-2 and 8-15 are rejected under 35 U.S.C. 102(e) as being anticipated by Khello et al. (US Pre-Grant Publication 20003/0007482).

As to claim 1, Khello et al. teaches a method for Internet domain name service provisioning, comprising:

receiving data to be supplied to database operations, the data including at least one Internet domain name comprising a plurality of successive labels separated by dots, said at least one Internet domain name being in a first format, wherein the at least one Internet domain name comprises at least one hostname and at least one top-level domain name (see Khello et al. paragraph [0058]. An ENUM request is formed, which is then submitted a DNS server. The ENUM request is an Internet domain name in a first format);

conditionally converting at least one of said at least one Internet domain name into a second format in which at least two successive labels of the at least one of said at least one Internet domain name are combined for form a single label, wherein the conditionally converting comprises converting the Internet domain name when the Internet domain name fulfills a predetermined condition (see paragraph [0058]. The ENUM request is sent to the DNS server in a second number, where it is converted to an E.164 telephone number by the DNS server extracting the E.164 telephone number. Successive labels in the ENUM request are combined to form the single label of the

Art Unit: 2164

E.164 number. This is done upon the condition of the second server receiving an ENUM request).

supplying the data to the database operations, the supplied data including at least one Internet domain name in the second format (see Khello et al. paragraph [0058]. The E.164 telephone number is submitted to database operations).

As to claim 2, Khello et al. teaches:

Examining whether an Internet domain name fulfills the predetermined condition in the first format (see paragraph [0058]).

As to claim 8, Khello et al. teaches:

receiving data including another Internet domain name in the second format (see paragraph [0058]); and

converting the another Internet domain name received in the second format back to the first format (see paragraph [0058]).

As to claim 9, Khello et al. teaches:

First means for receiving data to be supplied to database operations, the data including at least one Internet domain name comprising a plurality of successive labels separated by dots, said at least one Internet domain name being in a first format, wherein the at least one Internet domain name comprises at least one hostname and at least one top-level domain name (see paragraph [0058]);

second means for conditionally converting at least one of said at least one Internet domain name into a second format in which at least two successive labels of the at least one of said at least one Internet domain name are combined to form a single label, wherein the second means is configured to convert the Internet domain name when the Internet domain name fulfills a predetermined condition (see paragraph [0058]); and

third means for supplying the data to database operations, the supplied data including at least one Internet domain name in the second format (see paragraphs [0058]).

As to claim 10, Khello et al. teaches:

Fourth means for examining whether an Internet domain name fulfills the predetermined condition, the second means being configured to convert the Internet domain name into the second format when the Internet domain name fulfills the predetermined condition (see Khello et al. paragraph [0058]).

As to claim 11, Khello et al. teaches:

A first interface configured to receive data to be supplied to database operations, the data including at least one Internet domain name comprising a plurality of successive labels separated by dots, said at least one Internet domain name being in a first format, wherein the at least one Internet domain name comprises at least one hostname and at least one top-level domain name (see paragraph [0058]);

a modification module, operably connected to the first interface, configured to conditionally convert at least one of said at least one Internet domain name into a second format in which at least two successive labels of the at least one of said at least one Internet domain name form a single label, wherein the modification module is configured to convert the Internet domain name when the Internet domain name fulfills a predetermined condition (see paragraph [0058]); and

A second interface, operably connected to the modification module, configured to supply the data to database operations, the supplied data including at least one Internet domain name in the second format (see paragraphs [0058]).

As to claim 12, Khello et al. teaches:

Receiving data to be supplied to database operations, the data including at least one Internet domain name comprising a plurality of successive labels separated by dots, said at least one Internet domain name being in a first format, wherein the at least one Internet domain name comprises at least one hostname and at least one top-level domain name (see paragraph [0058]);

Conditionally converting at least one of said at least one Internet domain name into a second format in which at least two successive labels of the at least one of said at least one Internet domain name are combined to form a single label, wherein the conditionally converting comprises converting the Internet domain name when the Internet domain name fulfills a predetermined condition (see paragraph [0058]); and

Supplying the data to the database operations, the supplied data including at least one Internet domain name in the second format (see paragraphs [0058]).

As to claim 13, Khello et al. teaches:

A receiver unit configured to receive data to be supplied to database operations, the data including at least one Internet domain name comprising a plurality of successive labels separated by dots, said at least one Internet domain name being in a first format, wherein the at least one Internet domain name comprises at least one hostname and at least one top-level domain name (see paragraph [0058]);

A conversion unit configured to convert at least one of said at least one Internet domain name into a second format in which at least two successive labels of the at least one of said one Internet domain name are combined to form a single label, wherein the conversion unit is configured to convert the Internet domain name when the Internet domain name fulfills a predetermined condition (see paragraph [0058]); and

A supply unit configured to supply the data to database operations, the supplied data including at least one Internet domain name in the second format (see paragraphs [0058]).

As to claim 14, Khello et al. teaches:

An examination unit configured to examine whether an Internet domain name fulfills a predetermined condition, the conversion unit being configured to convert the

Internet domain name into the second format when the Internet domain name fulfills the predetermined condition (see paragraphs [0058]).

As to claim 15, Khello et al. teaches:

First interface means for receiving data to be supplied to database operations, the data including at least one Internet domain name comprising a plurality of successive labels separated by dots, said at least one Internet domain name being in a first format, wherein the at least one Internet domain name comprises at least one hostname and at least one top-level domain name (see paragraph [0058]);

Modification means, operably connected to the first interface means, for conditionally converting at least one of said at least one Internet domain name into a second format in which at least two successive labels of the at least one of said at least one Internet domain name form a single label, wherein the modification means is configured to conditionally convert the Internet domain name when the Internet domain name fulfills a predetermined condition (see paragraph [0058]); and

Second interface means, operably connected to the modification means, for supplying the data to database operations, the supplied data including at least one Internet domain name in the second format (see paragraphs [0058]).

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

Art Unit: 2164

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claims 3-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Khello et al. (US Pre-Grant Publication 20003/0007482) in view of Bagley et al. (US Patent 6,963,928).

As to claim 3, Khello et al. does not teach wherein the examining step includes examining whether said Internet domain name includes at least a predetermined number of labels beyond a given origin,

Bagley et al. teaches wherein the examining step includes examining whether said Internet domain name includes at least a predetermined number of labels beyond a given origin (see 8:29-36, 8:60-9:2);

Khello et al. as modified teaches said labels having a predetermined maximum length (see paragraph [0058]. The labels may be one digit long).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have modified Khello et al. by the teachings of Bagley et al., since Bagley et al. teaches that "one advantage of the foregoing feature of the present invention is that the variations and mistakes such as insertion of an underline instead of a hyphen are filtered out in the translation process" (see 9:60-63.

As to claim 4, Khello et al. as modified teaches wherein the predetermined condition upon which the converting is conditional is whether the Internet domain name

Art Unit: 2164

includes at least the predetermined number of labels beyond the given origin, such that the converting is performed for said Internet domain name when the examining indicates that the Internet domain name includes at least the predetermined number of labels beyond the given origin (see Bagley et al. 8:29-36, 8:60-9:2), said labels having the predetermined maximum length, and the converting is not performed when the examining indicates that the Internet domain name does not include at least the predetermined number of labels (see Bagley et al. 8:29-36, 8:60-9:2).

As to claim 5, Khello et al. as modified teaches wherein the predetermined number of labels is three (see Bagley et al. 8:60-9:2 and 13:5-12).

As to claim 6, Khello et al. as modified teaches wherein the predetermined maximum length is one byte (see paragraph [0058]).

As to claim 7, Khello et al. as modified teaches wherein the predetermined maximum length is one byte (see paragraph [0058]).

Response to Arguments

9. Applicant's arguments with respect to claims 1-15 have been considered but are moot in view of the new ground(s) of rejection.

Applicant argues that "in each of the references, the problem and solution disclosed are different from each other, and from that presented in the present application". In response to applicant's argument, it is noted that only Khello et al. is still being applied in the present rejection. It has been held that a prior art reference must either be in the field of applicant's endeavor or, if not, then be reasonably pertinent to the particular problem with which the applicant was concerned, in order to be relied upon as a basis for rejection of the claimed invention. See *In re Oetiker*, 977 F.2d 1443, 24 USPQ2d 1443 (Fed. Cir. 1992). In this case, Khello et al. is clearly in the same field of endeavor of applicant's current invention, as stated in applicant's preamble to the claims, "a method for Internet domain name service provisioning" (see Abstract of Khello et al.).

Conclusion

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to CHARLES D. ADAMS whose telephone number is (571)272-3938. The examiner can normally be reached on 8:30 AM - 5:00 PM, M - F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Charles Rones can be reached on (571) 272-4085. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Charles Adams
AU 2164


CHARLES RONES
SUPERVISORY PATENT EXAMINER